10/521,239 8/24/09

### INVENTOR SEARCH

=> d 15 ibib abs 1

L5 ANSWER 1 OF 1 HCAPLUS COPYRIGHT 2009 ACS on STN ACCESSION NUMBER: 2004:263765 HCAPLUS Full-text

DOCUMENT NUMBER: 140:399885

TITLE: Ascorbic acid treatment corrects the phenotype of a

mouse model of Charcot-Marie-Tooth disease
AUTHOR(S): Passage, Edith; Norreel, Jean Chretien;
Noack-Fraissignes, Pauline; Sangwedolce,

Noack-Fraissignes, Fauline; Sanguedolde, Veronique; Pizant, Josette; Thirion, Xavier;

Robaglia-Schlupp, Andree; Pellissier, Jean François;

Fontes, Michel

CORPORATE SOURCE: Faculte de Medecine de la Timone, IPHM, Institut
National de la Sante et de la Recherche Medicale

UMR491, Marseille, 13385, Fr.

SOURCE: Nature Medicine (New York, NY, United States) (2004),

10(4), 396-401

CODEN: NAMEFI; ISSN: 1078-8956

PUBLISHER: Nature Publishing Group

DOCUMENT TYPE: Journal

LANGUAGE: English

AB Charcot-Marie-Tooth disease (CMT) is the most common hereditary peripheral neuropathy, affecting 1 in 2,500 people. The only treatment currently available is rehabilitation or corrective surgery. The most frequent form of the disease, CMT-1A, involves abnormal myelination of the peripheral nerves. Here we used a mouse model of CMT-1A to test the ability of ascorbic acid, a known promoter of myelination, to correct the CMT-1A phenotype, Ascorbic acid treatment resulted in substantial amelioration of the CMT-1A phenotype, and reduced the expression of PMF22 to a level below what is necessary to induce the disease phenotype. As ascorbic acid has already been approved by the FDA for other clin. indications, it offers an immediate therapeutic possibility for patients with the disease.

OS.CITING REF COUNT: 48 THERE ARR 48 CAPLUS RECORDS THAT CITE THIS

OS.CITING REF COUNT: 48 THERE ARE 48 CAPLOS REC RECORD (48 CITINGS)

REFERENCE COUNT: 35 THERE ARE 35 CITED REFERENCES AVAILABLE FOR THIS

RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

RESULTS FROM SEARCHES IN REGISTRY, CAPLUS, MEDLINE, BIOSIS, EMBASE, AND DRUGU

```
=> d que stat 121
             2 SEA FILE=REGISTRY ABB=ON "ASCORBIC ACID"/CN
              1 SEA FILE=REGISTRY ABB=ON "ASCORBYL PALMITATE"/CN
L8
L9
             1 SEA FILE=REGISTRY ABB=ON "ASCORBYL DIPALMITATE"/CN
L11
             1 SEA FILE=REGISTRY ABB=ON N-ACETYLGLUCOSAMINE/CN
L12
       125170 SEA FILE=HCAPLUS ABB=ON L7 OR L8 OR L9 OR ?ASCORBIC?(W) ACID?
               OR ?ASCORBYL? (W) ?PALMITATE? OR ?DIPALMITAT? (W) L (W) ?ASCORBAT?
T.13
         20907 SEA FILE=HCAPLUS ABB=ON L12 AND (?GLYCO? OR ?MANNO? OR
                ?FRUCTO? OR ?FUCO? OR ?GALACTOSYL? OR ?ACETYLGLUCOSAMIN? OR
               L11 OR ?ACETYLMURAM? OR ?PHOSPHORYLAT? OR ?ALKALINE?(W)?EARTH?(
               W)?METAL? OR TRANSITION? (W)?METAL? OR ?SULFATE? OR ?SULPHATE?
               OR ?GLUCOSID? OR ?GLUCOPYRANOSYL? OR ?GALACTOPYRANOSYL?)
1.14
             2 SEA FILE=REGISTRY ABB=ON (ASCORBYL PHOSPHATE OR ASCORBYL
               SULPHATE OR ASCORBYL SULFATE OR ASCORBYL-2-GLUCOSIDE OR
                2-O-ALPHA-D-GLYCOPYRANOSYL ASCORBIC ACID OR 6-O-BETA-D-GALACTOP
                YRANOSYL L-ASCORBIC ACID OR MAGNESIUM ASCORBYL PHOSPHATE)/CN
T.15
           853 SEA FILE=HCAPLUS ABB=ON L14
L16
         21336 SEA FILE=HCAPLUS ABB=ON L13 OR L15
L17
              5 SEA FILE=HCAPLUS ABB=ON L16 AND (?CHARCOT?(3A)?MARIE?)(4A)(?TO
               OTH? OR ?TEETH? OR ?DENT?)
L18
             5 SEA L17
L19
             8 DUP REMOV L17 L18 (2 DUPLICATES REMOVED)
             2 SEA L19 AND (PRD<20020716 OR PD<20020716)
L20
1.21
             8 SEA L19 OR L20
=> d ibib abs 121 1-8
```

L21 ANSWER 1 OF 8 HCAPLUS COPYRIGHT 2009 ACS on STN ACCESSION NUMBER: 2008:283542 HCAPLUS Full-text

DOCUMENT NUMBER: 148:326169

TITLE: Generation of human embryonic stem cell-derived glial and neuronal cells, and use for the treatment of CNS

diseases INVENTOR(S): Revel, Michel; Chebat, Judith; Izrael, Michal;

Kaufman, Rosalia PATENT ASSIGNEE(S): Yeda Research and Development Co. Ltd., Israel

SOURCE: PCT Int. Appl., 72pp. CODEN: PIXXD2

DOCUMENT TYPE: Patent English

LANGUAGE: FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2008026198	A2	20080306	WO 2007-IL1026	20070815
WO 2008026198	A3	20090507		
W: AE, AG,	AL, AM, AT,	AU, AZ,	BA, BB, BG, BH, BR,	BW, BY, BZ, CA,
CH, CN,	CO, CR, CU,	CZ, DE,	DK, DM, DO, DZ, EC,	EE, EG, ES, FI,
GB, GD,	GE, GH, GM,	GT, HN,	HR, HU, ID, IL, IN,	IS, JP, KE, KG,
KM, KN,	KP, KR, KZ,	LA, LC,	LK, LR, LS, LT, LU,	LY, MA, MD, ME,
MG, MK, I	MN, MW, MX,	MY, MZ,	NA, NG, NI, NO, NZ,	OM, PG, PH, PL,
PT, RO, I	RS, RU, SC,	SD, SE,	SG, SK, SL, SM, SV,	SY, TJ, TM, TN,
TR, TT,	TZ, UA, UG,	US, UZ,	VC, VN, ZA, ZM, ZW	
RW: AT, BE,	BG, CH, CY,	CZ, DE,	DK, EE, ES, FI, FR,	GB, GR, HU, IE,

```
IS, IT, LT, LU, LV, MC, MT, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GM, GQ, GM, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AP, EA, EP, OA

EP 2064319

A2 20909603 EP 2007-790074

20070815

R: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, II, LI, LT, LU, LV, MC, MT, NL, PL, PT, RO, SE, SI, SK, TR, AL, BA, HR, MK, RS

PRIORITY APPIN. INFO: US 2006-840426P

PROORSES
```

WO 2007-IL1026 W 20070815

AB A method of generating neural and glial cells (such as oligodendrocytes) is provided. The method comprising growing human embryonic stem cells under conditions which induce differentiation of the human stem cells into the neural and glial cells, said conditions comprising the presence of retinoic acid and an agent capable of down-regulating Bone Morphogenic Protein activity. The neural and glial cells of the invention are used for the treatment of medical conditions of the CNS.

L21 ANSWER 2 OF 8 HCAPLUS COPYRIGHT 2009 ACS on STN ACCESSION NUMBER: 2007:1334626 HCAPLUS Full-text

DOCUMENT NUMBER: 148:17527

TITLE: Chimeric C3 exoenzyme-like Rho antagonists for treating injured nervous system and cancer INVENTOR(S): McKerracher, Lisa: Munzer, Jon Scott

PATENT ASSIGNEE(S): Can.

SOURCE: U.S. Pat. Appl. Publ., 106 pp., Cont.-in-part of U.S. Ser. No. 902,878.

CODEN: USXXCO

DOCUMENT TYPE: Patent LANGUAGE: English

FAMILY ACC. NUM. COUNT: 7

PATENT INFORMATION:

PAT	ENT I	NO.			KIN	D	DATE			APP:	LICAT	ION	NO.		Di	ATE		
US	2007	0270	340		A1		2007	1122		US :	2006-	6439	40		2	0061	222 <	<
CA	2342	970			A1		2002	1012		CA :	2001-	2342	970		2	0010	412	
CA	2362	004			A1		2002	1012		CA :	2001-	2362	004		2	0011	113 <	<
CA	2367	636			A1		2002	1012		CA :	2002-	2367	636		2	0020	115 <	<
US	2005	0059	595		A1		2005	0317		US :	2004-	9029	59		2	0040	802 4	<
US	7442	686			B2		2008	1028										
US	2006	0134	140		A1		2006	0622		US :	2004-	9028	78		2	0040	802 4	<
US	2008	0269	120		A1		2008	1030		US :	2007-	8087	73		2	0070	612 <	<
WO	2008	0772	36		A1		2008	0703		WO :	2007-	CA22	65		2	0071	212	
	W:	AE.	AG.	AL.	AM.	AT.	AU.	AZ.	BA.	BB	, BG,	BH.	BR.	BW.	BY.	BZ.	CA.	
											, DO,							
											ID,							
											LS,							
											, NI,							
											, SL,							
											, ZA,			01,	,	,	,	
	DH.										, ES,			CB	CD	HITT	TE	
	1411.										, PT,							
											, ML,							
											, SZ,							
									ου,	OL.	, 54,	14,	ou,	Ziri,	Zivi,	Part,	na,	
IORITY	ann:				PID,	RU,	TJ,	111		03	2001-	2212	070			0010	410	
IORIII	APP.	LIN.	TNEO	. :							2001- 2001-							
																	113 <	
										LA.	2002-	236/	036		A Z	UU20.	TTO 4	<

> P 20030929 US 2003-506162P US 2004-902878 A2 20040802 US 2004-902959 A2 20040802 US 2002-118079 A2 20020409 <--US 2006-643940 A2 20061222 US 2007-808773 A 20070612

The present invention provides novel chimeric ADP-ribosyltransferase (C3 exoenzyme)-like Rho antagonists having ability to penetrate inside target cells and inactivate Rho at low doses. In some embodiments, provided are sequences for variants of C3 fused to proline-rich transport peptide. The system for example may deliver an Rho antagonist(s) in a tissue adhesive, such as a fibrin glue, to create a delivery matrix in situ. The present invention relates to the use of chimeric C3-like Rho antagonists for promoting repair and neuron survival in injured mammalian central and peripheral nervous system and for treating or preventing cancer. OS.CITING REF COUNT: 1 THERE ARE 1 CAPLUS RECORDS THAT CITE THIS RECORD

(1 CITINGS)

L21 ANSWER 3 OF 8 HCAPLUS COPYRIGHT 2009 ACS on STN ACCESSION NUMBER: 2006:826060 HCAPLUS Full-text

DOCUMENT NUMBER: 146 - 198376

TITLE: Charcot-Marie-Tooth

disease: correction of the CMT-1A phenotype AUTHOR(S): Davies, Shelley L.; Moral, Ma Angels

CORPORATE SOURCE: Prous Science, Barcelona, 08080, Spain SOURCE: Drugs of the Future (2006), 31(6), 531-533

CODEN: DRFUD4: ISSN: 0377-8282 PUBLISHER: Prous Science

DOCUMENT TYPE: Journal LANGUAGE: English

Charcot-Marie-Tooth (CMT) disease

constitutes a group of prevalent hereditary, chronic and debilitating peripheral neuropathies. CMT type 1A (CMT-1A), the most common form of CMT, is autosomal dominant and is characterized by peripheral demyelination. No pharmacotherapies currently exist for CMT-1A, although identification of an underlying duplication in the gene for PMP22 (peripheral myelin protein 22), a glycoprotein expressed in myelin, has ignited the search for candidates to correct the CMT-1A phenotype. To date, these include the progesterone antagonist onapristone, the antioxidant ascorbic acid and the natural neurotrophic factor neurotrophin-3.

REFERENCE COUNT: 12 THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L21 ANSWER 4 OF 8 HCAPLUS COPYRIGHT 2009 ACS on STN ACCESSION NUMBER: 2004:60301 HCAPLUS Full-text

DOCUMENT NUMBER: 140:105308

TITLE: Cyclic AMP-modulating compounds and compositions for

the treatment of peripheral neuropathies, preparation

thereof, and uses

INVENTOR(S): Fontes, Michel; Passage, Edith; Sangeudolce,

Veronique; Noreel, Jean-Chretien

PATENT ASSIGNEE(S): Universite de la Mediterranee, Fr.; Institut National de la Sante et de la Recherche Medicale; Association

Française Contre Les Myopathies

SOURCE: PCT Int. Appl., 26 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: French FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

```
PATENT NO.
                        KIND DATE APPLICATION NO. DATE
      WO 2004006911
WO 2004006911
                              A2 20040122 WO 2003-FR2236 20030715
                               A3 20040408
          W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
                CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
                GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
                LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM,
                PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN,
                TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW
           RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,
                KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES,
                FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR,
                BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
      FR 2842422
                               A1
                                      20040123 FR 2002-8966
      FR 2842422
                               B1
                                      20060630
                            A1 20040122 CA 2003-2492368
A1 20040202 AU 2003-271807
A2 20050504 EP 2003-753643
B1 20080827
      CA 2492368
                                                                                    20030715
      AU 2003271807
EP 1526850
EP 1526850
                                                                                    20030715
                                                                                    20030715
      EP 1526850
           R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
                IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK

        JP 2005537264
        T
        20051208
        JP 2004-520788
        20030715

        AT 406158
        T
        20080915
        AT 2003-753643
        20030715

        ES 2312804
        T3
        200909301
        ES 2003-753643
        20030715

        US 20050187290
        A1
        20050825
        US 2005-521239
        20050414

PRIORITY APPLN. INFO.:
                                                       FR 2002-8966 A 20020716
WO 2003-FR2236 W 20030715
     The invention discloses the use of a cAMP modulator in the preparation of
```

compns. that are intended for the prevention or treatment of peripheral neuropathies. The invention further discloses tools and kits used to prepare the compns. The cAMP modulators of the invention include a variety of vitamin C compds.

OS.CITING REF COUNT: 1 THERE ARE 1 CAPLUS RECORDS THAT CITE THIS RECORD (1 CITINGS)

REFERENCE COUNT: THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L21 ANSWER 5 OF 8 HCAPLUS COPYRIGHT 2009 ACS on STN ACCESSION NUMBER: 1995:723143 HCAPLUS Full-text DOCUMENT NUMBER: 123:102794

ORIGINAL REFERENCE NO.: 123:18031a,18034a

TITLE: Pharmaceutical compositions and use thereof for

treatment of neurological diseases and etiologically

related symptomatology.

INVENTOR(S): Shapiro, Howard K.

PATENT ASSIGNEE(S): IISA

SOURCE: PCT Int. Appl., 155 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Face... English

FAMILY ACC. NUM. COUNT: 4

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9501096	A1	19950112	WO 1994-US7277	19940628 <
W: AU, CA, JP				

RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE

			8/24/09				
US	5668117	A	19970916	US	1993-62201		19930629 <
AU	9472144	A	19950124	AU	1994-72144		19940628 <
AU	692454	B2	19980611				
EP	707446	A1	19960424	EP	1994-921405		19940628 <
	R: DE, FR, GB,	IT					
JP	08512055	T	19961217	JP	1994-503597		19940628 <
PRIORITY	APPLN. INFO.:			US	1993-62201	A	19930629 <
				US	1991-660561	В1	19910222 <
				US	1993-26617	B2	19930223 <
				WO	1994-US7277	W	19940628 <

Pharmaceutical compns. for treatment of several neurol. diseases and pathophysiol .- related symptomol. in other body tissues, including peripheral neuropathies, secondary symptomol. of diabetes, Alzheimer's disease, Parkinson's disease, alc. polyneuropathy and age-onset symptomol., as well as analogous veterinary diseases, are disclosed. Spurious pathol. chemical crosslinking of normal intracellular structures is a fundamental aspect of these neurol, diseases. Covalent bond crosslinking of protein and lipid subcellular elements appear to underlie the formation of polymerized aggregates of neurofilaments and other structural proteins, and lipofuscin. Pharmacol. intervention in some neurol. diseases using water-soluble, small mol. weight primary amines or their derivs. as oral therapeutic agents, may compete with cellular protein and lipid amine groups for reaction with disease-induced carbonyl-containing aliphatic and aromatic hydrocarbons. Primary pharmacol. agents include 4-aminobenzoic acid and derivs. thereof to facilitate kidney recognition and removal. This invention also includes oral use of nonabsorbable polyamine polymers and amine-related co-agents, such as chitosan, to covalently bind and sequester potentially toxic carbonyl compds. present in the diet, oral use of known antioxidant co-agents and related nutritional factors and use of the primary agent and co-agents in combination with known medicaments for treatment of these neurol. diseases. OS.CITING REF COUNT: THERE ARE 19 CAPLUS RECORDS THAT CITE THIS

RECORD (23 CITINGS)

THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS REFERENCE COUNT: 14 RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L21 ANSWER 6 OF 8 EMBASE COPYRIGHT (c) 2009 Elsevier B.V. All rights reserved on STN

ACCESSION NUMBER: 2008481529 EMBASE Full-text

TITLE: Charcot-Marie-Tooth disease.

AUTHOR: Lee, Yi-Chung, Dr. (correspondence); Chang, Ming-Hon

CORPORATE SOURCE: Section of Neurology, Taichung Veterans General Hospital,

No. 160, Sec. 3, Chung-Kang Road, Taichung, Taiwan,

Province of China. yclee@vghtc.gov.tw

AUTHOR: Lee, Yi-Chung, Dr. (correspondence); Chang, Ming-Hon; Lin,

Kon-Ping

CORPORATE SOURCE: Department of Neurology, National Yang-Ming University

School of Medicine, Taipei, Taiwan, Province of China.

vclee@vahtc.gov.tw

AUTHOR: Lin, Kon-Ping

CORPORATE SOURCE: The Neurological Institute, Taipei Veterans General

Hospital, Taipei, Taiwan, Province of China.

SOURCE: Acta Neurologica Taiwanica, (September 2008) Vol. 17, No.

3, pp. 203-213.

Refs: 84

ISSN: 1019-6099 CODEN: ANETF5

PUBLISHER: Neurological Society R.O.C (Taiwan), 7 Chung-Shan S. Road,

Taipei, 100, Taiwan, Province of China.

COUNTRY: Taiwan, Province of China

DOCUMENT TYPE: Journal; Article

FILE SEGMENT: 008 Neurology and Neurosurgery

022 Human Genetics

029 Clinical and Experimental Biochemistry

037 Drug Literature Index

FILE SEGMENT: ClinicalTrials.gov

CLINICAL TRIAL NO.: NCT00484510

LANGUAGE: Chinese

SUMMARY LANGUAGE: English; Chinese

ENTRY DATE: Entered STN: 27 Oct 2008

Last Updated on STN: 27 Oct 2008

AB Charcot-Marie-Tooth disease (CMT), also called hereditary motor and sensory neuropathy (HMSN), is the most common inherited peripheral neuropathy, comprised by a group of genetically heterogeneous disorders that share clinical characteristics of progressive distal muscle weakness and atrophy, foot deformities, distal sensory loss, and depressed tendon reflexes. It can be categorized according to its electrophysiological or pathological features, transmission patterns, age of disease onset, and molecular pathology. CMT type 1 (CMT1; MIM 118200) is a group of autosomal dominant-inherited demyelinating neuropathies with a disease onset at or after childhood. Five different subtypes have been identified based on different causative genes. Among them, CMT1A (MIM # 118220) is most common and is usually associated with a duplication of a 1.5-Mb region on chromosome 17p11.2, which includes peripheral myelin protein 22 gene (PMP22; MIM \*601097). Currently, there is no cure or obviously effective disease-modifying treatment for CMT. Two potential effective therapeutic agents for CMT1A were investigated recently. One is ascorbic acid and another is neurotrophin-3 (NT-3), an important component of the Schwann cell autocrine survival loop. Early diagnosis can facilitate CMT patients to modify their life styles timely for minimizing nerve injury to delay or avoid disability. Molecular diagnosis of CMT can provide the basis for appropriate genetic counseling and further CMT research.

L21 ANSWER 7 OF 8 EMBASE COPYRIGHT (c) 2009 Elsevier B.V. All rights reserved on STN

ACCESSION NUMBER: 2008461683 EMBASE

Full-text TITLE:

Experimental Therapeutics in Hereditary Neuropathies: The Past, the Present, and the Future.

Herrmann, David N. (correspondence) AUTHOR:

CORPORATE SOURCE: Department of Neurology-NMD, University of Rochester Medical Center, Rochester, NY 14642, United States.

David Herrmann@urmc.rochester.edu

SOURCE: Neurotherapeutics, (October 2008) Vol. 5, No. 4, pp.

507-515. Refs: 51

ISSN: 1933-7213

PUBLISHER:

Elsevier Inc., 360 Park Avenue South, New York, NY 10010,

United States. PUBLISHER IDENT .: S 1933-7213(08)00135-9

COUNTRY: United States DOCUMENT TYPE: Journal; Article

FILE SEGMENT: 008 Neurology and Neurosurgery

022 Human Genetics

036

Health Policy, Economics and Management

037 Drug Literature Index 038 Adverse Reactions Titles

FILE SEGMENT: ClinicalTrials.gov

CLINICAL TRIAL NO.: NCT00484510; NCT00541164

LANGUAGE: English

SUMMARY LANGUAGE: English ENTRY DATE:

Entered STN: 10 Nov 2008

Last Updated on STN: 10 Nov 2008

Hereditary neuropathies represent approximately 40% of undiagnosed AB neuropathies in a tertiary clinic setting. The Charcot- Marie-Tooth neuropathies (CMT) are the most common. Mutations in more than 40 genes have been identified to date in CMT. Approximately 50% of CMT cases are accounted for by CMT type 1A, due to a duplication within the peripheral myelin protein 22 gene (PMP22). Mutations in the gap junction beta 1 gene (GJB1), the myelin protein zero gene (MPZ), and the mitofusin 2 gene (MFN2) account for a substantial proportion of other genetically definable CMT. Some 15% of demyelinating CMT and 70% of axonal CMT await genetic clarification. Other hereditary neuropathies include the hereditary sensory and autonomic neuropathies, the familial amyloid polyneuropathies, and multisystem disorders (e.g., lipid storage diseases and inherited ataxias) that have peripheral neuropathy as a major or minor component. This review surveys the challenges of developing effective therapies for hereditary neuropathies in terms of past, present, and future experimental therapeutics in CMT. .COPYRGT. 2008 The American Society for Experimental NeuroTherapeutics, Inc.

# L21 ANSWER 8 OF 8 EMBASE COPYRIGHT (c) 2009 Elsevier B.V. All rights

reserved on STN

AUTHOR:

COUNTRY:

ACCESSION NUMBER: 2005111091 EMBASE Full-text

TITLE: [Genetic defects of myelination: Molecular pathogenesis of

the Charcot-Marie-Tooth

disease (CMT1A)].

Genetische Defekte der Myelinbildung: Molekulare

Pathogenese der Charcot-Marie-Tooth Neuropathie (CMT1A).

AUTHOR: Mever zu Horste, Gerd (correspondence)

CORPORATE SOURCE: Abteilung Neurogenetik, Max-Planck-Inst. fur Exp. Medizin,

Hermann-Rein-Strasse 3, D-37075 Gottingen, Germany.

g.mzh@em.mpg.de

Sereda, Michael W.

CORPORATE SOURCE: Abteilung fur Neurologie, Universitatsklinikum Gottingen,

Robert-Koch-Str. 40, D-37075 Gottingen, Germany. sereda@em.

mpg.de

SOURCE: Neuroforum, (Feb 2005) Vol. 11, No. 1, pp. 25-30.

Refs: 5

ISSN: 0947-0875

Germany

DOCUMENT TYPE: Journal; Article

FILE SEGMENT: 022 Human Genetics

029 Clinical and Experimental Biochemistry

037 Drug Literature Index

005 General Pathology and Pathological Anatomy

008 Neurology and Neurosurgery

LANGUAGE: German

SUMMARY LANGUAGE: German: English

ENTRY DATE: Entered STN: 24 Mar 2005

Last Updated on STN: 24 Mar 2005

AB Hereditary neuropathies comprise a heterogenous group of genetic disorders of the peripheral nervous system. Among the underlying defects, the malfunction of myelin-forming Schwann cells is most common and associated with dys— and demyelination of peripheral nerves. However, clinically important is the secondary degeneration of affected axons and denervated muscle fibres, both of which underlie the characteristic muscle weakness in this disease. The most frequent hereditary neuropathy, Charact—Marie—Tooth disease type 1a (CMTIA), is caused by a 1.5Mb genomic duplication within chromosome 17. Overexpression of a structural myelin protein gene (PMP22) contained in this region leads to demyelination and axonal loss. This has been formally proven by overexpression of PMP22 in transgenic disease models. Such models are not

10/521,239 8/24/09

only important for analysing pathomechanisms of the disease. They have also proven as invaluable tools to explore novel experimental therapies for  ${\tt CMTIA}.$ 

#### SEARCH RESULTS

#### => d his ful

1.8

L9

L10

(FILE 'HOME' ENTERED AT 15:56:14 ON 25 AUG 2009)

FILE 'HCAPLUS' ENTERED AT 15:56:22 ON 25 AUG 2009

E FONTES MICHEL/AU

- 47 SEA ABB=ON "FONTES MICHEL"/AU
- E PASSAGE EDITH/AU
- 32 SEA ABB=ON ("PASSAGE E"/AU OR "PASSAGE EDITH"/AU)
- E SANGUEDOLCE VERONIQUE/AU
- 3 SEA ABB=ON ("SANGUEDOLCE V"/AU OR "SANGUEDOLCE VERONIQUE"/AU) T. 3
- E NOREEL JEAN CHRETIEN/AU
- 1 SEA ABB=ON "NOREEL JEAN CHRETIEN"/AU L4 1.5
- 1 SEA ABB=ON L1 AND L2 AND L3 L6 ANALYZE L5 1 CT : 8 TERMS

# FILE 'REGISTRY' ENTERED AT 15:58:04 ON 25 AUG 2009

- E ASCORBIC ACID/CN
- L7 2 SEA ABB=ON "ASCORBIC ACID"/CN
  - E ASCORBYL PALMITATE/CN 1 SEA ABB=ON "ASCORBYL PALMITATE"/CN
  - E DIPALMITATE L-ASCORBATE/CN
    - E ASCORBYL DIPALMITATE/CN
    - 1 SEA ABB=ON "ASCORBYL DIPALMITATE"/CN
      - E ASCORBIC ACID, GLYCOSYLAT/CN
      - E ASCORBIC ACID GLYCOSYLAT/CN
      - E ASCORBIC ACID MANNOSYLAT/CN
      - E MANNOSYLATED ASCORBIC ACID/CN
      - E MANNOSYLASCORBIC ACID/CN
      - E FRUCTOSYLASCORBIC ACID/CN
      - E GLYCOSYLIC/CN

      - E GLYCOSYL/CN
      - E MANNOSYL/CN
      - E GLYCOSYLATE/CN
      - E GLYCOSYL/CN
      - E GLYCOSYLIC/CN
      - E GLYCOSYLASC/CN
      - E MANNOSYL/CN
    - 0 SEA ABB=ON GALACTOSYL/CN
      - E GALACTOSYL/CN
        - E N-ACETYLGLUCOSAMIN/CN
- L11 1 SEA ABB=ON N-ACETYLGLUCOSAMINE/CN

## FILE 'HCAPLUS' ENTERED AT 16:06:19 ON 25 AUG 2009

- 125170 SEA ABB=ON L7 OR L8 OR L9 OR ?ASCORBIC?(W)ACID? OR ?ASCORBYL?( W) ?PALMITATE? OR ?DIPALMITAT? (W) L (W) ?ASCORBAT?
- 1.13 20907 SEA ABB=ON L12 AND (?GLYCO? OR ?MANNO? OR ?FRUCTO? OR ?FUCO? OR ?GALACTOSYL? OR ?ACETYLGLUCOSAMIN? OR L11 OR ?ACETYLMURAM? OR ?PHOSPHORYLAT? OR ?ALKALINE?(W)?EARTH?(W)?METAL? OR TRANSITION? (W) ?METAL? OR ?SULFATE? OR ?SULPHATE? OR ?GLUCOSID? OR ?GLUCOPYRANOSYL? OR ?GALACTOPYRANOSYL?)

FILE 'REGISTRY' ENTERED AT 16:10:09 ON 25 AUG 2009

FILE 'REGISTRY' ENTERED AT 16:10:13 ON 25 AUG 2009

1.14 2 SEA ABB=ON (ASCORBYL PHOSPHATE OR ASCORBYL SULPHATE OR ASCORBYL SULFATE OR ASCORBYL-2-GLUCOSIDE OR 2-O-ALPHA-D-GLYCOPY

RANOSYL ASCORBIC ACID OR 6-O-BETA-D-GALACTOPYRANOSYL L-ASCORBIC ACID OR MAGNESIUM ASCORBYL PHOSPHATE)/CN

L15 853 SEA ABB=ON L14 L16 21336 SEA ABB=ON L13 OR L15 5 SEA ABB=ON L16 AND (?CHARCOT?(3A)?MARIE?)(4A)(?TOOTH? OR L17 ?TEETH? OR ?DENT?) FILE 'MEDLINE, BIOSIS, EMBASE, DRUGU' ENTERED AT 16:13:07 ON 25 AUG 2009 L18 5 SEA ABB=ON L17

FILE 'HCAPLUS, BIOSIS, EMBASE' ENTERED AT 16:14:43 ON 25 AUG 2009 8 DUP REMOV L17 L18 (2 DUPLICATES REMOVED) L20 2 SEA ABB=ON L19 AND (PRD<20020716 OR PD<20020716) L21 8 SEA ABB=ON L19 OR L20

FILE 'HCAPLUS' ENTERED AT 16:11:30 ON 25 AUG 2009

FILE HOME

T.19

FILE HCAPLUS

Copyright of the articles to which records in this database refer is held by the publishers listed in the PUBLISHER (PB) field (available for records published or updated in Chemical Abstracts after December 26, 1996), unless otherwise indicated in the original publications. The CA Lexicon is the copyrighted intellectual property of the American Chemical Society and is provided to assist you in searching databases on STN. Any dissemination, distribution, copying, or storing of this information, without the prior written consent of CAS, is strictly prohibited.

FILE COVERS 1907 - 25 Aug 2009 VOL 151 ISS 9 FILE LAST UPDATED: 24 Aug 2009 (20090824/ED) REVISED CLASS FIELDS (/NCL) LAST RELOADED: Jun 2009 USPTO MANUAL OF CLASSIFICATIONS THESAURUS ISSUE DATE: Jun 2009

HCAplus now includes complete International Patent Classification (IPC) reclassification data for the second quarter of 2009.

CAS Information Use Policies apply and are available at:

#### http://www.cas.org/legal/infopolicy.html

This file contains CAS Registry Numbers for easy and accurate substance identification.

The ALL, BIB, MAX, and STD display formats in the CA/CAplus family of databases have been updated to include new citing references information. This enhancement may impact record import into database management software. For additional information, refer to NEWS 9.

## FILE REGISTRY

Property values tagged with IC are from the ZIC/VINITI data file provided by InfoChem.

STRUCTURE FILE UPDATES: 24 AUG 2009 HIGHEST RN 1175276-34-2 DICTIONARY FILE UPDATES: 24 AUG 2009 HIGHEST RN 1175276-34-2

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH June 26, 2009.

Please note that search-term pricing does apply when conducting SmartSELECT searches.

REGISTRY includes numerically searchable data for experimental and predicted properties as well as tags indicating availability of experimental property data in the original document. For information on property searching in REGISTRY, refer to:

http://www.cas.org/support/stngen/stndoc/properties.html

#### FILE MEDITNE

FILE LAST UPDATED: 22 Aug 2009 (20090822/UP). FILE COVERS 1949 TO DATE.

MEDLINE and LMEDLINE have been updated with the 2009 Medical Subject Headings (MeSH) vocabulary and tree numbers from the U.S. National Libra of Medicine (NLM). Additional information is available at

http://www.nlm.nih.gov/pubs/techbull/nd08/nd08\_medline\_data\_changes\_2009.

On February 21, 2009, MEDLINE was reloaded. See HELP RLOAD for details.

This file contains CAS Registry Numbers for easy and accurate substance identification.

See HELP RANGE before carrying out any RANGE search.

#### FILE BIOSIS

FILE COVERS 1926 TO DATE.

CAS REGISTRY NUMBERS AND CHEMICAL NAMES (CNs) PRESENT FROM JANUARY 1926 TO DATE.

RECORDS LAST ADDED: 19 August 2009 (20090819/ED)

BIOSIS has been augmented with 1.8 million archival records from 1926 through 1968. These records have been re-indexed to match current BIOSIS indexing.

#### FILE EMBASE

FILE COVERS 1974 TO 25 Aug 2009 (20090825/ED)

EMBASE was reloaded on March 30, 2008.

EMBASE is now updated daily. SDI frequency remains weekly (default) and biweekly.

This file contains CAS Registry Numbers for easy and accurate substance identification.

Beginning January 2008, Elsevier will no longer provide EMTREE codes as part of the EMTREE thesaurus in EMBASE. Please update your current-awareness alerts (SDIs) if they contain EMTREE codes.

For further assistance, please contact your local helpdesk.

#### FILE DRUGH

FILE LAST UPDATED: 25 AUG 2009 <20090825/UP>

10/521,239 8/24/09

- >>> DERWENT DRUG FILE (SUBSCRIBER) <<<
- >>> FILE COVERS 1983 TO DATE <<<
- >>> THESAURUS AVAILABLE IN /CT <<<